BEFORE THE OFFICE OF THE COMMISSIONER OF RAILROADS

STATE OF WISCONSIN

Petition of the Wisconsin Department of Transportation for the Alteration of a Public Crossing of the Wisconsin Central Ltd. Tracks with Oneida Street in the City of Green Bay, Brown County

9164-RX-621

FINAL DECISION

By letter dated November 21, 2005, the Wisconsin Department of Transportation (DOT) filed a petition with the Office of the Commissioner of Railroads (OCR) under §§195.28 and 195.29, Stats., for the alteration of a public crossing of the Wisconsin Central Ltd. (WCL) tracks with Oneida Street in the City of Green Bay, Brown County (crossing no. 281 432X / MP 1.29).

Pursuant to due notice, public hearing was held in this matter on December 21, 2005, in Green Bay, Wisconsin with hearing examiner Douglas S. Wood presiding.

On December 29, 2005, the hearing examiner issued a proposed decision. By letter dated December 13 (and slightly amended on December 17) the DOT filed comments objecting to the cost apportionment of the proposed decision.

DOT primarily argues that section 86.13 does not allow the OCR to apportion costs for improvements to crossings no matter what. Under the DOT's reasoning, the railroad would be required to pay 100% of the cost to replace a crossing to meet a highway improvement project even if the crossing was brand new. The rule of reasonableness inheres in every law. DOT's interpretation would lead to fundamentally unfair and unreasonable results.

DOT also objects that the proposed decision misrepresented its position on cost-sharing. This objection is much ado about not much. DOT's primary position was that 86.13 did not allow the apportionment of costs and the proposed decision says as much. In response to the railroad's argument for apportionment of 85% of the costs to the public, DOT did argue that, if the cost was to be apportioned then the railroad should pay two-thirds of the cost. The Commissioner modifies the language to clarify that DOT's reference to a two-thirds split was only in response to the railroad's argument.

The Commissioner adopts the proposed decision as final.

Appearances:

Parties

Wisconsin Department of Transportation, Petitioner by Mark Morrison, PE Grade Crossing Safety Engineer PO Box 7914 Madison, WI 53707-7914

In Support:

City of Green Bay by Paul Fontecchio Principal Pavement Engineer 100 N. Jefferson Street, Room 300 Green Bay, WI 54303

As Interest May Appear:

Wisconsin Central Ltd.
by
Terry Lee, PE
Manager Public Works
1625 Depot Street
Stevens Point, WI 54481

Findings of Fact

THE COMMISSIONER FINDS:

The DOT and the City of Green Bay propose to reconstruct Oneida Street between W. Mason Street and Badger Street in 2006. The current roadway is 4-lane undivided roadway that is 43' wide between curbs with 5' wide sidewalks. The reconstructed roadway would still be 43' wide but would consist of two travel lanes and a center two-way-left-turn-lane (TWLTL). At the crossing the TWLTL would be replaced with a median. The crossing width would be unchanged (61').

The crossing consists of one mainline track.

Oneida Street carried 10,800 ADT (average daily traffic) in 2004, including 15.8% truck traffic. The City projects Oneida Street will carry 12,000 ADT in the design year of 2026. The speed limit is 25 mph.

The railroad currently operates 2 train movements per day over the crossing location at a maximum speed of 25 mph. Typical speed is less than 20 mph.

A driver traveling at 25 mph needs a distance of 187' to stop safely. The crossing is visible from more than 187' in each direction. Assuming a train speed of 20 mph, a driver traveling at 25 mph needs to see a train when it is 210' from the crossing from a point 187' down the highway. The sight distance available in each quadrant from the safe stopping distance is as follows: 187' in the northwest quadrant, 103' in the northeast quadrant, 62' in the southwest quadrant and 76' in the southeast quadrant. Sight distance is inadequate in all quadrants.

At all crossings, except those with gates, a driver stopped 15' short of the near rail must be able to see far enough down the track, in both directions, to determine if sufficient time exists for

moving their vehicle safely across the tracks to a point 15' past the far rail, prior to the arrival of a train. Required clearing sight distance along both directions of the track, from the stopped position of the vehicle, is dependent upon the maximum train speed and the acceleration characteristics of the "design" vehicle. The necessary clearing sight distance at the Oneida Street crossing is 450'. The available clearing sight distance is more than 450'.

The exposure factor at this crossing is about 21,600. The exposure factor at this crossing will be about 24,000 in the design year assuming 2 train movements per day. The exposure factor equals the product of the number of trains per day and the number of highway vehicles per day, which yields a numerical value for the potential conflicts each day at the crossing.

Five train-vehicle accidents have occurred at this crossing since 1973. The accidents occurred in 1992, 1990, 1984, 1981, and 1977.

The crossing presently has 12" incandescent automatic flashing lights with motion sensors for warning devices. These warning devices are inadequate. The existing warning devices will be adequate until such time as the new warning devices are installed. In order to adequately protect public safety, 12" LED automatic flashing lights with gates and constant warning time circuitry are needed.

During the project the roadway will be closed to through traffic, but will be open to local traffic (except when the crossing is being replaced and the roadway is totally closed). During the project the DOT and City propose the installation of stop signs and crossbucks for warning devices until the new automatic flashing lights and gates are activated. The existing automatic flashing lights will be in the way of construction and need to be removed. Stop signs will be adequate as an interim measure based on the low number of trains, greatly reduced roadway traffic during construction, and adequate clearing sight distance.

The DOT and City propose a concrete-paneled crossing. The existing crossing surface is timber-plank and asphalt. The railroad concurred. Based on the traffic volume a concrete-paneled crossing is warranted.

Costs

The DOT and the City propose that the railroad pay 100% of the cost to replace the existing crossing. The railroad argued that the crossing has five years or more of use left. A timber-plank and asphalt crossing typically lasts 10-15 years. Thus, the railroad argued, it should not have to pay the entire cost to replace the crossing. The WCL suggested that it pay 15% of the cost. DOT argued that section 86.13 imposes a duty on the railroad to improve the crossing to meet the highway project at its own expense and that no apportionment is allowed. Alternatively, in response to the railroad's position on cost apportionment, DOT argued that the railroad should pay two-thirds of the cost based on the railroad's estimation of remaining life in the crossing.

The **Commissioner** concludes that section 86.13 requires the railroad to meet a roadway improvement project with an improvement at its tracks regardless of the current condition of the crossing. The duty to perform the work is separate from the question of who pays for the work. The **Commissioner** concludes that section 86.13 allows the OCR to apportion the cost.

Section 86.13 does not expressly state whether the railroad must bear the entire cost of

improving its crossing. However, section 86.13 (2) refers to the "sum as may be **equitably due** for the performance of a duty imposed by this section upon the company." From the use of the phrase 'equitably due' the OCR infers that the statute requires a fair and reasonable apportionment of the cost.

In the typical case where the crossing is substantially at the end of its useful life, the railroad's equitable share will be 100%. The word 'substantially' is purposely used because determining the remaining life in an at-grade crossing is necessarily somewhat inexact. The life of a crossing varies based on a variety of conditions such as the quality of the original construction, the volume and type of train traffic, the volume and type of highway traffic, soil conditions and so forth.

In this case, the **Commissioner** finds and concludes that the railroad is entitled to reimbursement for 30% of the cost to replace the Oneida Street crossing. First, it is undisputed that the crossing has substantial remaining life. Unfortunately, the railroad did not present any testimony as to when the crossing was last replaced. **In future cases, such testimony will be very useful, if not essential, in determining the reimbursement due to the railroad.** Second, based on the volume of highway traffic and especially the fact that 15.8% of the traffic is truck traffic, an unusually high proportion, the **hearing examiner** finds that the useful life of this crossing was originally closer to the 10-year end of the life-expectancy spectrum. Thus, the crossing has about 50% of its life remaining.

In this instance, however, the highway project will bear the cost of the detour required when the roadway is closed for crossing repairs. Normally the railroad would bear this cost. The cost to detour traffic runs from about \$1,000 to \$7,000 depending on the complexity and length of the detour. In this instance, the detour is likely to be at the higher end based on the volume of roadway traffic, especially trucks. **In future cases**, it would be useful to have more and better evidence regarding these costs in order for the OCR to more fairly and accurately apportion these costs.

Timing. The highway project is scheduled for 2006. The City proposed that the crossing work be completed by August 1, 2006. The City also proposed that the new automatic flashing lights and gates be installed by August 11, 2006. The City would prefer that these new warning devices be installed by July 28, 2006. Installation of the new automatic flashing lights and gates by either of those dates will be challenging. The OCR has expedited its handling of the matter. The parties, including the railroad, indicated a willingness to expedite their work as well.

If the signals are not installed by the time the highway project is completed, the roadway can not be reopened to unrestricted traffic until the new warning devices are installed and activated. In that event the OCR would *consider* imposing a temporary stop and flag order on the railroad as an alternative to retaining the stop signs. However, the OCR notes its general reluctance to require railroad flaggers on streets with 10,000+ ADT.

Constant warning time circuitry adjusts for train speed and causes the crossing signals to always operate for the same amount of time before the train reaches the crossing, regardless of train speed. A motion detector simply detects the train operation, but does not adjust for train speed so that the amount of warning time varies based on train speed.

Light emitting diodes (LED) lamps replace incandescent bulbs. LEDs have higher conspicuity, a wider cone of vision, and longer life than incandescent lights. LEDs are especially useful on east-west roadways where the rising and setting sun may make the signals difficult to see.

In summary, the improvement of the crossing at-grade of the WCL tracks with Oneida Street will promote public safety and convenience by providing a new roadway surface, new warning devices and medians on each approach. The medians will particularly discourage motorists from driving around the gates.

Source of funding: The roadway project shall pay 100% of the cost for the signal materials and installation. The railroad shall bear 70% of the cost for the replacement of the crossing.

Ultimate Conclusions on the Issues

THE COMMISSIONER CONCLUDES:

- 1. That the improvement of the crossing at-grade of Oneida Street with the Wisconsin Central Ltd. tracks in accordance with the design plans of the Wisconsin Department of Transportation and the City of Green Bay in the City of Green Bay, Brown County will promote public safety and convenience.
- 2. That in order to adequately protect and promote public safety, it is necessary to install and maintain 12" LED automatic flashing lights with gates. During construction, crossbucks and stop signs will adequately protect and promote public safety.
- 3. That it is reasonable that the Wisconsin Central Ltd. bear 70% of the cost for the crossing construction.

Conclusion of Law

THE COMMISSIONER CONCLUDES:

That the jurisdiction of the Office of the Commissioner of Railroads under §§86.12, 86.13, 195.28 and 195.29, Stats., extends to this matter. Accordingly, the Office enters an order consistent with the findings of fact.

Order

THE COMMISSIONER ORDERS:

1. That the **Wisconsin Central Ltd.** shall install and maintain a concrete-paneled crossing at-grade of **Oneida Street** with its tracks in accordance with the design plans of the City of Green Bay in the City of Green Bay, Brown County by **August 1, 2006** (Crossing No. 281 432X / MP 1.29).

- 2. That the **Wisconsin Central Ltd.** shall install and maintain 12" LED automatic flashing lights with gates, constant warning time circuitry, and other appropriate appurtenances in accordance with such plans as are filed with and approved by the Office of the Commissioner of Railroads at the crossing of its tracks with **Oneida Street** at-grade in the City of Green Bay, Brown County by **August 11, 2006** (Crossing No. 281 432X / MP 1.29).
- 3. That the **Wisconsin Central Ltd.** shall submit to the Office of the Commissioner of Railroads signal and circuit plans with the cost estimate of its proposed installation and upon completion of the signal project, a detailed statement of the actual cost to the Office and to the Wisconsin Department of Transportation.
- 4. That the signal installation work herein ordered shall not begin until the regional office of the Wisconsin Department of Transportation informs the railroad that they may start such work and such start notice will not be issued until appropriate federal aid or other funding arrangements have been assured. The cost of the new project initiated before the start notice will not be reimbursed with public funds and shall be the responsibility of the railroad.
- 5. That the **Wisconsin Central Ltd. in coordination with the City of Green Bay** shall install and maintain retroreflective back-to-back crossbucks with 2" wide reflective vertical strips on the front and back of the support posts on each approach to the crossing of its tracks with **Oneida Street** at-grade in the City of Green Bay, Brown County by **June 12, 2006**.
- 6. That the **City of Green Bay** shall install and maintain stop signs on separate posts on each approach to the crossing of the Wisconsin Central Ltd. tracks with **Oneida Street** atgrade in the City of Green Bay, Brown County by the **date on which the existing signals are removed from service**.
- 7. That the **City of Green Bay** shall not open **Oneida Street** at the railroad crossing to unrestricted public use until the installation and activation of the automatic warning devices ordered above.
- 8. That the **Wisconsin Central Ltd.** shall bear 70% of the cost of the crossing construction and any cost assessed to the railroad pursuant to §195.60, Stats., for the investigation of this matter by the Office. The railroad shall not pass on those assessment costs either directly or indirectly.
 - 9. That jurisdiction is retained.

Dated at Madison, Wisconsin, (January 20, 2006).

By the Office of the Commissioner of Railroads.

Rodney W. Kreunen
Commissioner of Railroads

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